

REMARKS

Responsive to the outstanding Office Action, applicant has carefully studied the Examiner's rejections and the comments relative thereto. Favorable reconsideration of the application is respectfully requested in light of the amendments and following detailed arguments.

In this response, claims 1, 3, 4, 7-10 and 12 -13 have been amended. It is respectfully submitted that no new matter has been presented in this amendment.

INDICATION OF ALLOWABLE SUBJECT MATTER

Claims 3-10 were indicated as being allowable by the Examiner if rewritten in independent form including the limitations of their base claims and any intervening claims, and to correct the informalities noted herein. For the reasons stated below it is believed that broader claim coverage is available.

INFORMATION DISCLOSURE STATEMENT

The Examiner notes that certain documents referenced in the application have not been properly disclosed on an Information Disclosure Statement, and absent such would not be considered. Therefore, an Information Disclosure Statement is being submitted in the present matter under separate cover.

OBJECTIONS TO THE CLAIMS

Claims 1-15 were objected to by the Examiner for containing numerous informalities. The Examiner made several specific objections to claims 1, 3, 4, 7, 8, 9, 10, 12 and 13.

In response thereto, claims 1 and 12 were amended to remove the "in particular language." Claim 3 was amended to clarify that the sensor unit served two functions. Claim 4 was amended to show what element is used to measure heat conductivity. Claim 7 was amended to provide proper antecedent basis. Claim 8 was amended to remove the objected language. Claim 9 was amended to replace the incorrect term "or"

with the correct term “for”. And claim 13 was amended to correct the objected to language. It is therefore believed that the claim objections have been overcome.

REJECTIONS UNDER 35 USC §112, SECOND PARAGRAPH

The Examiner rejected claim 13 under 35 USC §112, second paragraph as being indefinite. In response thereto, claim 13 has been amended to remove the term “and/or” which was rejected by the Examiner. It is therefore submitted that claim 13 fully complies with the requirements of 35 USC §112, second paragraph and reconsideration and withdrawal of this rejection are respectfully requested.

REJECTIONS UNDER 35 USC §102

Claims 1, 2 and 11 have been rejected by the Examiner under 35 USC §102 as being anticipated by US 4,345,463 to Wilson.

Claim 1 defines a method for measuring a meterable gas energy supply in the private, public or industrial sphere, utilizing sensor signals (S), which are proportional to a flow rate of the gas. The signals are determined by a gas meter by means of a thermal flow sensor and the sensor signals (S) are output as energy value signals (S_E) on the basis of a calibration of the gas meter as energy meter. A gas type is determined by the gas meter insofar as a non-combustible gas mixture is differentiated from a combustible gas mixture, and the gas meter, in the presence of a non-combustible gas mixture, is operated with a calibration in mass or standard volume units (l/min) and, in the presence of a combustible gas mixture, with a calibration in energy units (kWh).

Similarly, claim 12 defines a gas meter for measuring a meterable gas energy supply in the private, public or industrial sphere, the gas meter having a thermal flow sensor which sensor is also used to determine gas composition of the gas mixture and being calibrated in energy units (kWh) as energy meter. The gas meter is calibrated in addition as mass flowmeter in mass or standard volume units (l/min). The gas meter also has a gas quality sensor which generates a discrimination signal, in particular a gas type-dependent parameter (λ , c , α , η) in order to differentiate a combustible gas

mixture from a non-combustible gas mixture, and the gas meter can be switched over on the basis of the discrimination signal between an operation as energy meter or as mass flowmeter.

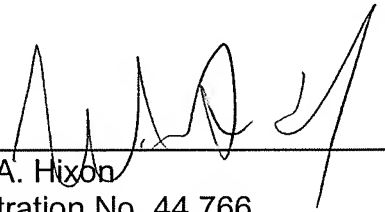
Wilson discloses a system for measuring on-line the energy content and flow of a gas mixture within a pipeline. The system includes a gas chromatograph for producing a time varying signal related to the component composition of the gas mixture. The pressure and temperature of the gas mixture is measured and these signals as well as the time varying signal from the chromatograph are converted to digital form. These signals are applied to control means which produces energy and flow rate signals of the gas mixture in the pipeline based on the on-line pressure, temperature and component composition. These signals are corrected by supercompressibility factor signals as a function of component composition.

It is important to note that the Wilson reference discloses an on-line gas measurement and analysis system which requires a gas chromatograph for determining the component composition of the gas mixture. Wilson admittedly mentions a thermal flow sensor but this sensor is only used for generating a sensor signal which is outputted as an energy volume signal. Wilson makes no disclosure of a method or device for using this sensor to determine both functions, as is done by the method (claim 1) and device (claim 12) of the present invention. As Wilson provides separate devices to complete these functions, and these functions are completed by one unit in the present invention, it is respectfully submitted that claims 1 and 12 distinguish over the applied reference.

Claims 2-11 and 13-15, each of which depend directly or indirectly from what is believed to be an allowable base claim, are believed to be allowable based, at least, upon this dependence. Therefore, all of the claims presently on file are believed to be in condition for allowance and action towards that end is respectfully requested.

Should the Examiner wish to modify the application in any way, applicant's attorney suggests a telephone interview in order to expedite the prosecution of the application.

Respectfully submitted,



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